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PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of FILIPPI et al.

Application No.

Examiner:

Filed: Herewith

Group Art Unit:

For: PLANT FOR UREA PRODUCTION

SUBMISSION OF COPY OF ANNEXES TO INTERNATIONAL PRELIMINARY EXAMINATION REPORT

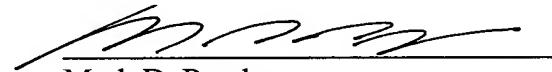
Mail Stop PCT
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Sir:

Please find attached a copy of the Annexes to the International Preliminary Examination Report. Please note that the claims attached hereto are for information purposes only, as they are further amended in a preliminary amendment filed herewith.

Respectfully submitted,

Dated: 12-28-04



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Docket No. 9526-48

of said metallic plates, extending perpendicularly to said ducts (31, 32).

11. Plant according to claim 10, characterised in that each of said chambers (121a) is internally equipped with a plurality of deflector plates (122), extending parallel to said ducts (31, 32) and defining a substantially winding path for said operating fluid.

12. Plant according to claim 1 and according to any one of claims 2 to 11, characterised in that said condensation unit has a substantially annular cylindrical configuration, crossed axially by a passage (14) with a predetermined diameter, in which said plurality of heat exchangers (17, 117, 123) are distributed in many coaxial and concentric rows, in a substantially radial arrangement.

15 13. Plant according to claim 2, characterised in that at least one of said exchangers (123) is internally equipped with a separator plate (124), extending from one side (123c) of said exchanger (123), towards a side (123b) opposite it and from which said plate (124) is in a predetermined distanced relationship, said plate (124) defining in said chamber (125) a substantially U-shaped fluid path having descending and ascending portions (125a, 125b), respectively, in communication with the outside of the exchanger through respective connectors (126, 127).

25 14. Heat exchange unit according to claim 13, characterised in that said separator plate (124) extends in said chamber (125) in a direction forming an angle with said side (123c), for which reason the portions (125a, 125b) of said fluid path inside the exchanger (123) have a gradually increasing cross-section.

15. Plant according to any one of the previous claims, characterised in that said exchangers (17, 117, 123) have predetermined cross sections of less than the cross sections of a manhole opening arranged in correspondence
5 with a base plate of said reactor.
16. Condenser, in particular for the so-called high-pressure section of a plant for urea production from ammonia and carbon dioxide, comprising a condensation unit (7, 107) in turn comprising a plurality of flattened plate-shaped essentially rectangular heat exchangers (17, 117, 123), arranged with long sides (17a, 117a, 123a) parallel
10 to the axis of said condenser.